

1. (Cancelled)

2. (Cancelled)

3. (Cancelled)

4. (Cancelled)

5. (Cancelled)

6. (Cancelled)

7. (Cancelled)

8. (Cancelled)

9. (Cancelled)

10. (Cancelled)

11. (Cancelled)

12. (Cancelled)

13. (Cancelled)

14. (Cancelled)

15. (Cancelled)

16. (Currently Amended) A multilayer semiconductor sensor, comprising:

a first functional layer;

a second functional layer;

an intermediate layer disposed between the first and the second functional layers in a first predetermined region; and

a plurality of anchoring elements each embedded in at least two of the first and the second functional layers and the intermediate layer, where the anchoring elements comprise a different material than that of the first and the second functional layers.

17. (Previously Presented) The multilayer semiconductor sensor of claim 16, where each of the plurality of anchoring elements is embedded in the second functional layer and in the intermediate layer.

18. (Previously Presented) The multilayer semiconductor sensor of claim 16, where a cross-sectional area of each of the plurality of anchoring elements is cylindrical.

19. (Previously Presented) The multilayer semiconductor sensor of claim 16, where a cross-sectional area of each of the plurality of anchoring elements increases from one end of the anchoring element to the other end of the anchoring element.

20. (Currently Amended) The multilayer semiconductor sensor of claim 16, where each of the plurality of anchoring elements has a conical ~~conical~~ shape.

21. (Currently Amended) The multilayer semiconductor sensor of claim 16, where the first and the second functional layers adjoin each other in a second predetermined ~~regions~~ region that is outside the first predetermined region.

22. (Previously Presented) The multilayer semiconductor sensor of claim 16, where the intermediate layer is adhered to the first functional layer.

23. (Previously Presented) The multilayer semiconductor sensor of claim 16, where a diameter of each of the plurality of anchoring elements lies in a range between 100 and 1000 nm.

24. (Previously Presented) The multilayer semiconductor sensor of claim 16, where a spacing between the plurality of anchoring elements lies in a range between 100 and 1000 nm.

25. (Previously Presented) The multilayer system of claim 16, where each of the plurality of anchoring elements is embedded into the second functional layer at a depth of between 20 and 500 nm.

26. (Currently Amended) The multilayer semiconductor sensor of claim 16, where a thickness of each of the first and the second functional layers lies in a range between 100 and 1000 nm.

27. (Previously Presented) The multilayer semiconductor sensor of claim 16, where the intermediate layer comprises a dielectric material.

28. (Cancelled)

29. (Cancelled)

30. (Cancelled)

31. (Cancelled)

32. (New) A multilayer semiconductor, comprising:

- a first functional layer;
- a second functional layer coupled to the first functional layer; and
- a plurality of anchoring elements disposed between, and partially embedded in at least one of the first and the second functional layers, where the anchoring elements comprise a different material than that of the first and the second functional layers.

33. (New) The multilayer semiconductor of claim 32, further comprising an intermediate layer disposed between the first and the second functional layers, where the plurality of anchoring elements are partially embedded in the intermediate layer.